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Conference Abstract

The Arctos Community Model for Sustaining and Enriching Access to Biodiversity Data

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Abstract

Arctos (http://arctosdb.org) is a leader in providing museums with collaborative solutions to managing information in their collections. As both a community and a collection management database platform, Arctos is a consortium of museums that collaborate to serve secure and rich data on over 3 million records from natural and cultural history collections through a partnership with the Texas Advanced Computing Center (TACC). An additional 2 million records are in MCZBase, a separate instance at the Museum of Comparative Zoology, Harvard University. Our community collaboratively guides the development of Arctos, shares and develops data vocabulary and standards, and curates and improves the quality of shared data (e.g., agents, geography, and taxonomy). Due to the loss of a permanent staff line at the University of Alaska in 2015, Arctos transitioned to a subscription-based business model in 2016 that funds daily maintenance of the database and future development. Arctos participants pay a tiered subscription fee based on the number of specimens served from their collection(s), plus a $0.02 per specimen cost. Data migration support is available at an additional cost, which depends on the level of assistance required. Collections may apply for a fee reduction with the understanding that

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they will work to get funds to cover the cost, or they may offset fees with in-kind support through staff time (e.g., assistance with documentation) or expertise. Collections staff also contribute collectively to Arctos through their participation in the Arctos Working Group and Steering Committee. Additional funding support is provided by institutional or collaborative grants that drive specific developments and benefit the Arctos community as a whole. The Arctos community and data platform are sustained by participating collections' personnel who contribute actively to governance, documentation, development, and funding efforts, as well as by subscription fees. The addition of new collections to the Arctos community provides infusions of new data and expertise, but also contributes to the distribution of platform costs. The change in funding model has created new opportunities to enrich Arctos by adding collections of different sizes and disciplines, and has increased synergy among the curators and data managers who use Arctos as their collection management system.

Keywords

collection data management system, community engagement, subscription-based

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